

Let it be assumed that only a single ball 18 has been removed from the chamber 20. The operator then relocates the cap 12 upon the body portion 14 so that thread 24 becomes coupled with the thread 26. In this position an air-tight seal is established between the O-ring 28 and the smaller diameter section 30 of the cap 12. It is to be noted that the diameter of the thread 24 is equal to or greater than the diameter of the section 30 in order to permit passage of the O-ring 28 past the thread 24. With the air-tight connection being initially established between the cap 12 and the body 14, as the cap 12 is rotated about the body 14, a recompression occurs within the chamber 16 caused by a compressing of the gas within the chamber 16. The longitudinal movement of the cap 12 upon the body 14 is preselected so that the compression of the gas within the chamber 16 is to the value of approximately 13 pounds per square inch with three balls located in the chamber 16. Therefore, the balls which are not in use in being retained within the chamber 16 are not caused to deteriorate but are stored in a satisfactory pressurized environment.

It is to be understood that with one or two balls removed from chamber 16, a pressurization of less than the initial 13 psi would result. However, a partial pressurization is better than no pressurization.

At the time the operator decides to relocate the ball that is being used within the container 10, the container 10 is opened, the ball inserted in the container 10 and then closed. This causes a pressurization of the gas within chamber 16 and prevents the ball that was used from deteriorating as well as the unused balls.

Referring particularly to FIG. 4 of the drawings, like numerals have been employed to refer to like elements. The container 32 of FIG. 4 retains the balls 18' in a manner similar to the previous embodiment. However, the cap 12' is substantially interiorly recessed to form cylindrical extension 34. The cylindrical extension 34 is closed at its innermost end 36. Mounted exteriorly about the extension 34 within a groove is an O-ring seal 38. The seal 38 causes an air-tight connection to be established between the extension 34 and the body 14' by location of such within the chamber 16'. The cap 12' includes an interior thread 24' in a manner which was described in the previous embodiment. Also, the body 14' includes an exterior thread 26'. As the cap 12' is rotated about the body 14' with the threads 24' and 26' being coupled, a compressing of the gas within the chamber 16' is caused, resulting in a pressurizing of the balls 18'.

It is considered to be within the scope of this invention that other modified forms of containers can be employed without departing from the scope of this invention. For example, a single thread 24 and 26 is employed upon each container. However, a double thread could be readily employed, it only being that a single thread is desirable for purposes of reduced friction. Also, it is considered to be within the scope of this application to make other changes in structure without departing from the concept of the pressurized container having a gradual build-up of pressure therein and a gradual release of pressure when the cap is removed. Another modification would be the employment of the O-ring adjacent the threads in a groove within the smaller section 30 of the cap 12 in lieu of being employed at the end of the body 14.

What is claimed is:

1. A pressurized container comprising:
a body having an interior chamber to be pressurized;

a rigid cap for compressing air in said interior chamber, said cap being longitudinally and bodily movable relative to said body from an initial position to a completely closed position;

first means located between said cap and said body to establish an air-tight connection therebetween, said first means causes establishment of said air-tight connection when said cap and body are in said initial position and maintains said air tight connection during movement of said cap in either direction between said completely closed position and said initial position, thereby resulting in gradual change in pressure in said interior chamber as said cap moves in either direction between said positions; and

second means mounted on both said cap and said body, said second means capable of interlocking to effect movement from said initial position to said completely closed position and to result in securement of said cap upon said body in said completely closed position.

2. The container as defined in claim 1 wherein:
said cap having a second interior chamber;
said body being insertable within said second interior chamber, said first means being located between the wall of said second interior chamber and said body.

3. The container as defined in claim 1 wherein:
both said body and cap being cylindrical in configuration;
said second means comprises a threaded arrangement including a first thread mounted upon said cap and a second thread mounted upon said body.

4. The container as defined within claim 2 wherein:

said first thread is on the interior surface of said cap and said second thread is on the exterior surface of said body, said threads becoming coupled at said initial position and remaining coupled during movement of said cap to said completely closed position.

5. The container as defined in claim 4 wherein:
said first means comprises an O-ring seal which is formed of a resilient material, said seal being located between said second means and said interior chamber for all positions of said cap between said initial position and said completely closed position.

6. The container as defined in claim 1 wherein:
said first means comprises an O-ring seal which is formed of a resilient material, said seal being located between said second means and said interior chamber for all positions of said cap between said initial position and said completely closed position.

7. The container as defined in claim 1 wherein:
said cap including an extension, said extension being adapted to matingly cooperate within said interior chamber of said body, said first means being located between said extension and said body.

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